MAIDEN DRILL PROGRAM PLANNED AT ULTRA HIGH PURITY MCINTOSH GRAPHITE PROJECT

Highlights

- GCM has planned its maiden drill program which will test 4 priority targets that have never been drill tested before within the companies **substantial 50-100Mt* Exploration Target.**
- The Threadfin target which was previously reported to have a considerable **exploration target of 25-50Mt*** is also being drill tested as a priority.
- Very limited reconnaissance work had been conducted over these key targets, **in some cases rock chip samples had been collected for the first time.**
- The maiden drill program will consist of ~10,500m of RC drilling (130 holes) to test the 5 priority targets, diamond drilling for metallurgical test work will follow pending the success of the maiden RC program.
- Petrographic samples to determine the indicative flake size for each target remain outstanding and will be released to market shortly once received and reviewed.
- The company is also in late stages of engaging an engineering firm with a focus on having significant graphite experience to commence the Pre-Feasibility Study (PFS).

* Cautionary Statement: The potential quantity and grade of the Exploration Targets is conceptual in nature, there has been insufficient exploration work to estimate a mineral resource and it is uncertain if further exploration will result in defining a mineral resource as determined by JORC 2012 guidelines.

Green Critical Minerals Pty Ltd ("**GCM**" or "**the Company**") which holds earn-in rights for up to 80% of the advanced Ultra High Purity / High Quality McIntosh Graphite Project (see CML's announcement on 15 June 2022) is pleased to announce to market that it plans to commence it's maiden Reverse Circulation (RC) Drilling program on the company's flagship McIntosh Graphite Project ("**the Project**") in the first half of Q2 2023.

A 10,500 m RC drilling program has been planned to follow up on high grade rock chip samples collected from the rock 10-day chip and mapping field program completed in September 2022 and announced to ASX on 28 October 2022. The field mapping program focussed on areas of high electromagnetic (EM) response that have not been previously investigated, drilled or rock chip sampled. The EM highs are a critical exploration tool as the graphitic mineralisation is highly conductive and presents itself with this tenor of response.

Nine targets were investigated over the course of the field program (Figure 1) – Marlin West, Marlin, Marlin South, Willis, Threadfin, Mahi Mahi, Trevally, Wahoo and Cobia). The scope of the field trip was to provide a first pass reconnaissance over the primary target areas and to map and sample any outcropping graphitic schist identified in order to determine indicative flake size and grade of each target. A total of 65 rock chip samples were collected which were submitted for analysis with ALS in Perth and reported to the market on 20 December 2022. The petrographic sampling of each target remains outstanding and will be reported to the market in due course.

Notable rock chip samples results from the rock chip sampling program include:

- Marlin West - 5.73%, 4.96% and 4.98% Total Graphitic Carbon (TGC).
- Threadfin - 6.76%, 5.3%, and 4.39% TGC
- Trevally - 4.94%, 3.32% and 3.08% TGC
- Cobia - 6.65%, 4.72% and 4.52% TGC

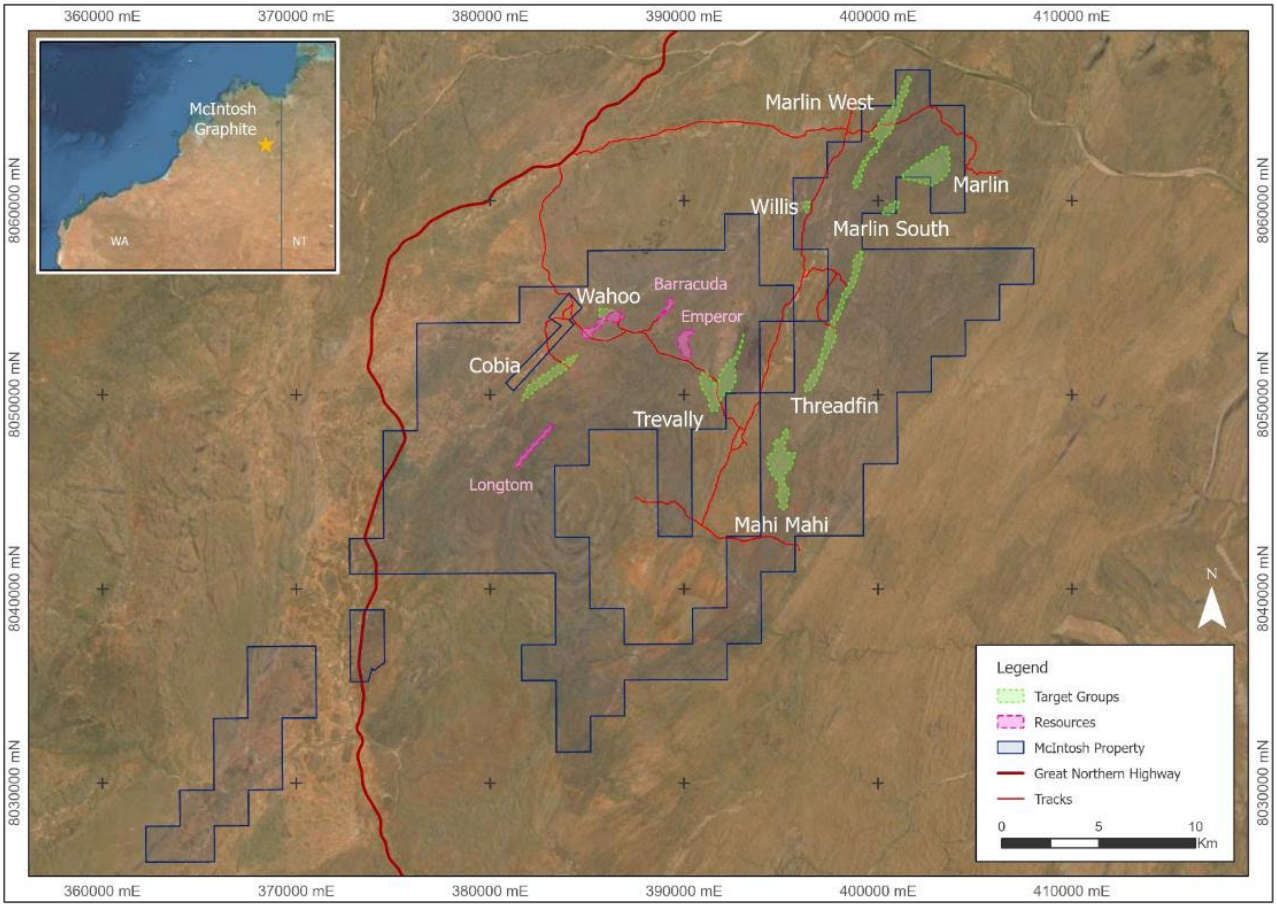

Figure 1; McIntosh Project location map showing the relative positions of the 9 exploration targets visited and the current JORC reported resources at Emperor, Barracuda, Wahoo, and Longtom

MCINTOSH REVERSE CIRCULATION DRILLING PROGRAM

GCM is planning to commence its maiden drilling program at its McIntosh Graphite Project in the first half of Q2 this year. Of the initial nine target areas initially focussed on for the reconnaissance mapping and sampling, drilling has been indicatively planned at Marlin, Marlin West, Threadfin, Trevally and Cobia prospects (Figure 2). A total of 130 RC drill holes for 10,500m has been planned to test the previously untested prospects. Drilling has initially been planned on 160 m line spacing with 40 to 80 m spacing along the drill lines.

GCM has submitted an Heritage Impact Application (HIA) to the Malarngowem Aboriginal Corporation (the traditional owners of the Project) in order to seek approval and to complete a heritage survey over the planned access tracks and drill lines. This work is ongoing.

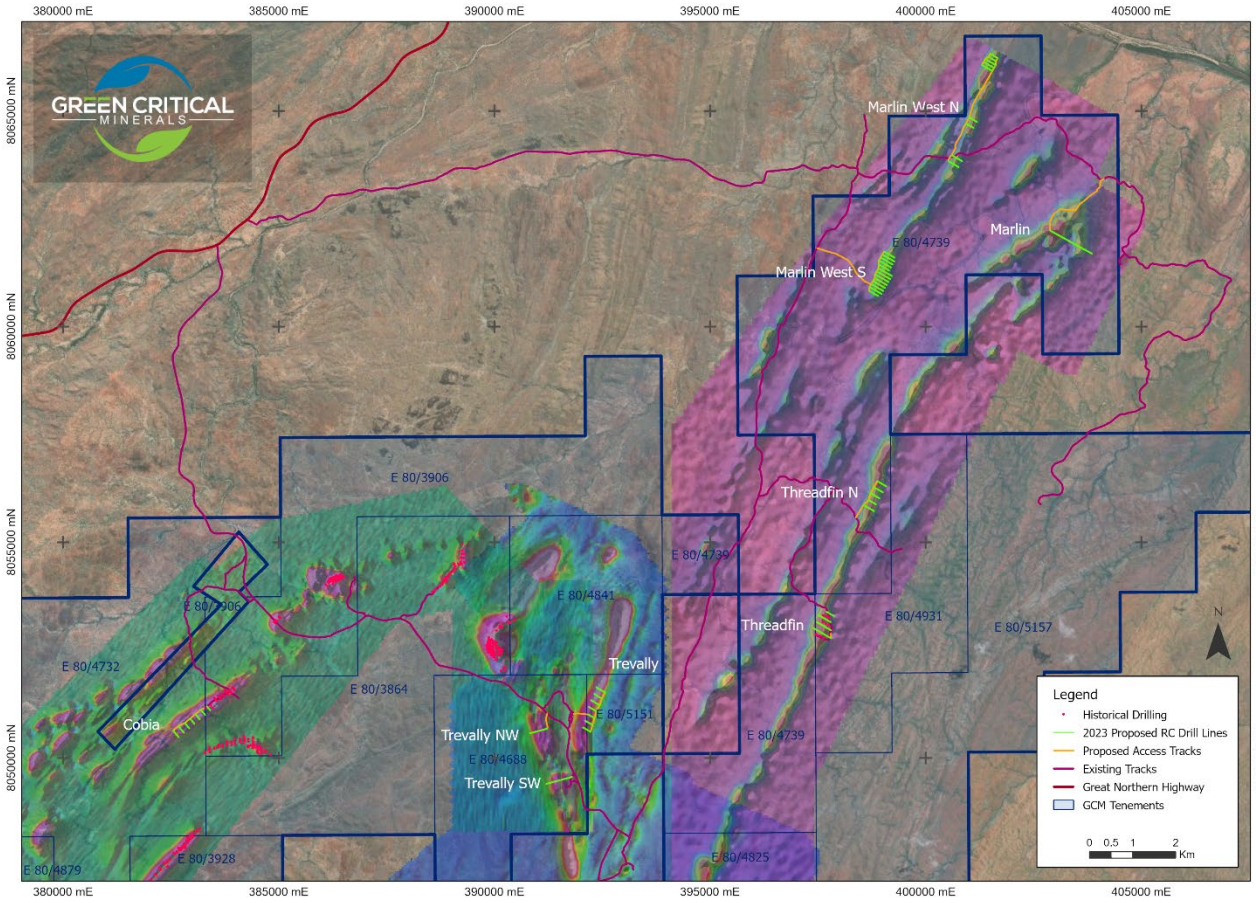

Figure 2; *McIntosh Project location map showing the planned drill lines with respect electromagnetic surveys.*

Marlin West Trend

The Marlin West area represents a **high priority target for GCM (Figure 1)**. The drilling over the Marlin West Trend has been planned to test three main areas of the 6 km electromagnetic anomaly (Figure 2). The southern area of Marlin West comprises two zones of **outcropping graphite mineralisation that ranges in width up to 21m.** Mapping confirms that these two graphitic units dip between 70^{o} to 80^{o} to the west. A total of 13 Rock chip samples were collected over of these two units with assay results up to 5.73% TGC with an average of 3.73% TGC over an 800m of strike. Drilling will test the mapped outcropping graphic zones, high grade rock chip samples and will also test a gently dipping modelled Electromagnetic conductor (50m from surface) identified by Southern Geoscience Consultants from the 2017 Xcite EM survey (Figure 4).

The northern portion of the Marlin West EM anomaly Is the other area of Interest for drill testing. Once again it comprises of **two distinct zones that range in width up to 21m** that dip 60^{o} to 80^{o} to the west. A total of 8 rock chip samples were taken from the northern portion of the Marlin West trend. Rock chip results peak at 4.98% TGC with an average of 2.01% TGC over an 800m strike length. Drilling is also planned

to both follow up on the highly encouraging rock chip samples and to concurrently test two long narrow EM conductors (20m from surface) modelled to dip moderately to the west (Figure 5).

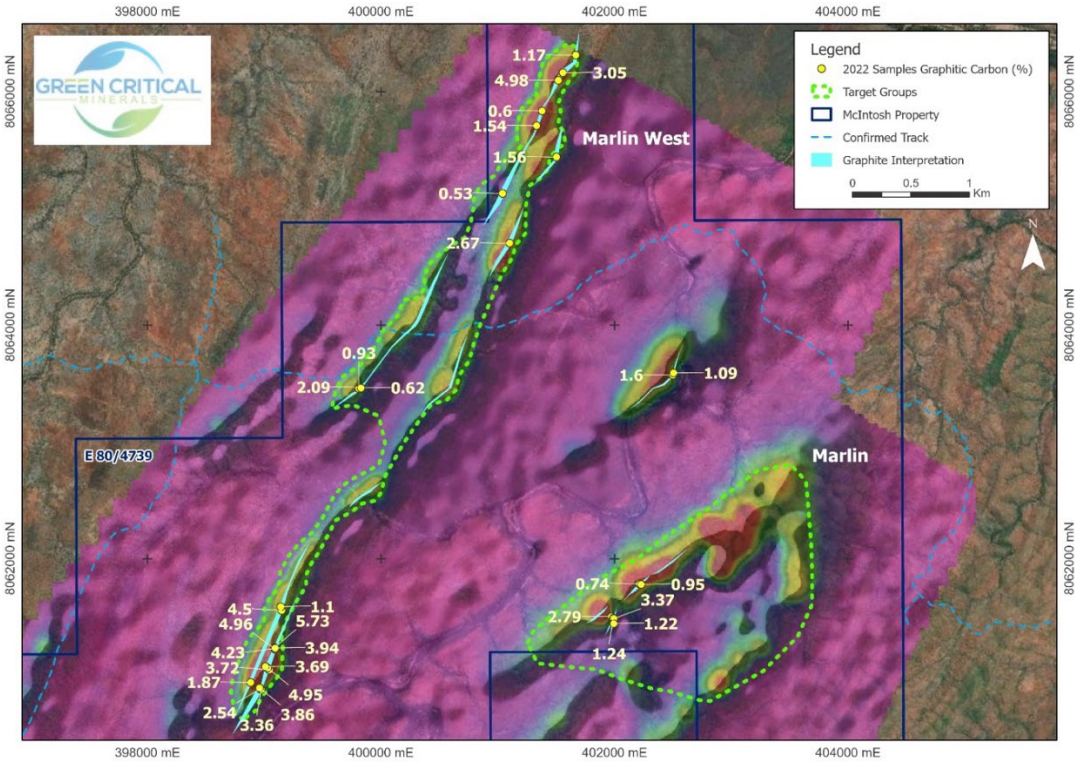

Figure 3; Mapping and rock chip results over the Marlin area and coincident EM anomalies.

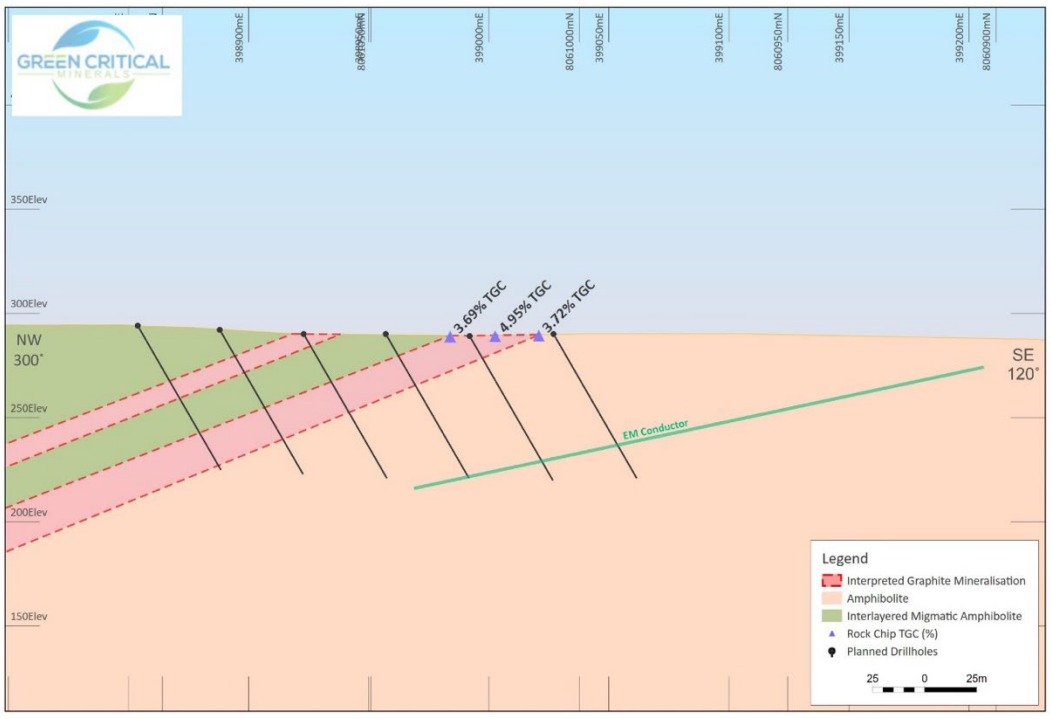

Figure 4; Schematic Drill section over the southern Marlin West trend with the planned drilling, rock chip samples and modelled EM plates.

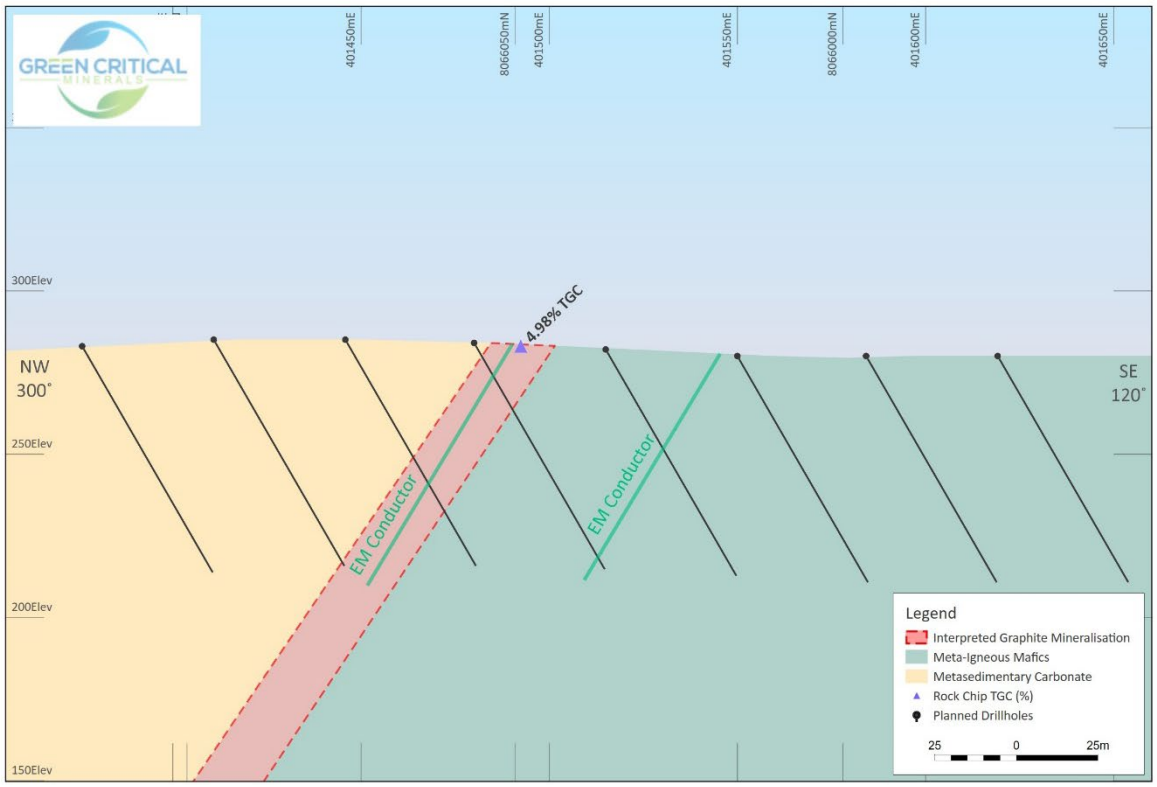

Figure 5; Schematic Drill section over the northern Marlin West trend with the planned drilling, rock chip samples and modelled EM plates.

THREADFIN

The Threadfin target (Figure 1) was targeted based on the extent of the EM high in the northern and southern parts of the trend and based on review of the historical drilling which produced significant shallow results. These included 9 m at 5.1% TGC from 13m & 5 m at 5.5% TGC from 25m (TFRC001) and 3 m at 4.9% TGC from 35m (TFRC0009).

The northern portion of the trend is comprised of **two parallel zones traced over ~500m strike length** (Figure 6). The exposed outcrop in this target area ranges from 2m to 4 m in thickness, however this is not thought to be true thickness of mineralisation as the outcrop is not well exposed and more deeply weathered. A total of four rock chip samples were collected from Threadfin North. **Results from the rock chip sampling suggest that the northern extension of Threadfin is the most prospective with four rock chips returning + 3.5% TGC and peaking a 4.39% TGC.** Drilling is also planned to both follow up on the highly encouraging rock chip samples and to concurrently test a EM conductor (At or near surface) modelled to dip moderately to the west (Figure 7). There has been no historic drilling completed on the northern portion of Threadfin.

The southern EM high which has been drill tested has an interpreted **strike length of ~2 km, with multiple sub-parallel units observed** (Figure 6). Unit thickness in outcrop ranges from 2m to 8m in width. The graphite is hosted in graphitic schist units with minor carbonate veining observed. Rock chip samples assayed up to 6.76% TGC in this area. The higher rock chip samples comprising 6.73%, 5.3% & 4.41% TGC are in the vicinity of the historic drilling. Planned drilling is designed to follow up on the very encouraging rock chip samples, existing drilling and testing of multiple EM modelled conductors.

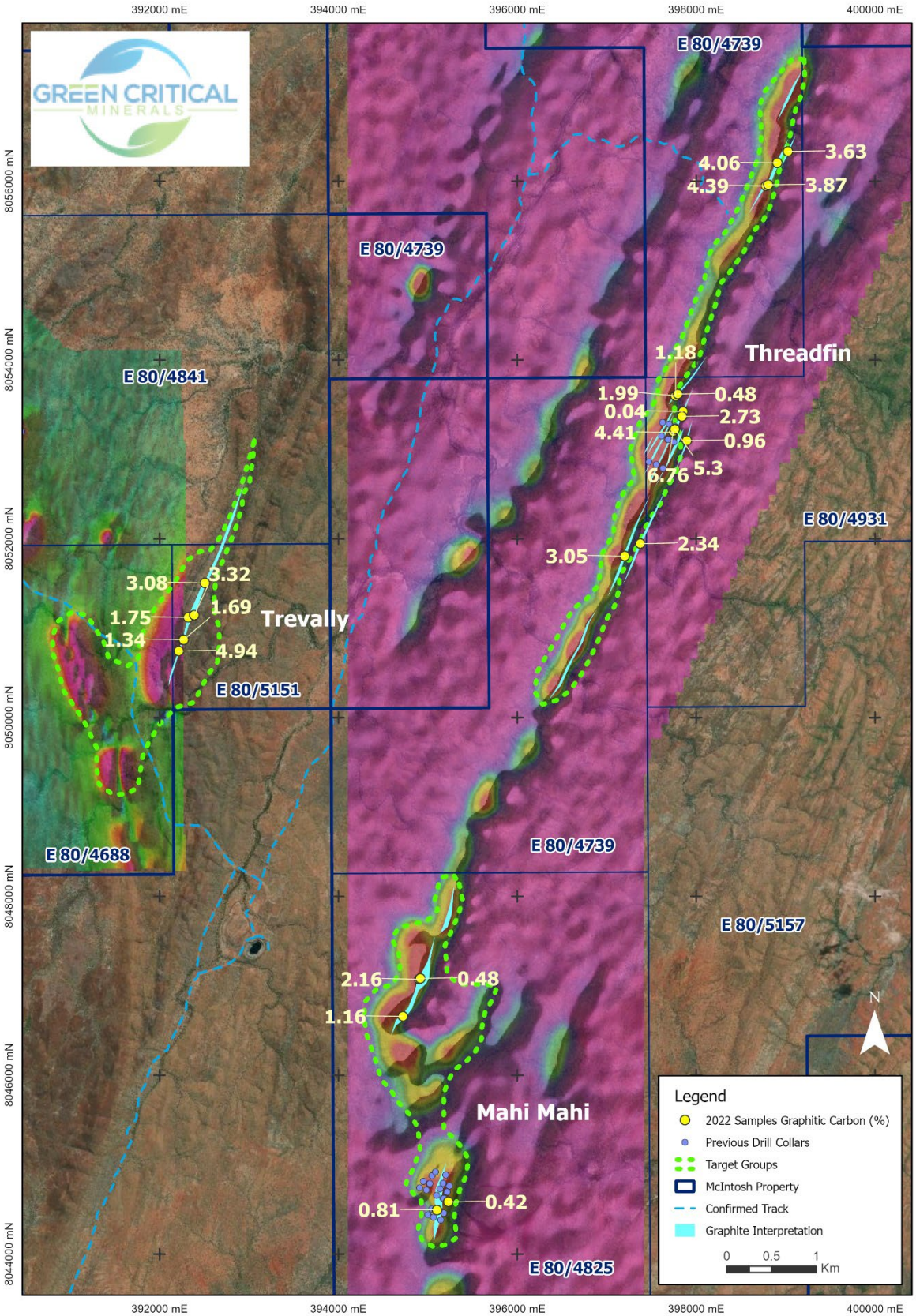

Figure 6; Mapping and rock chip sampling over the Threadfin/Trevally area and coincident EM anomalies.

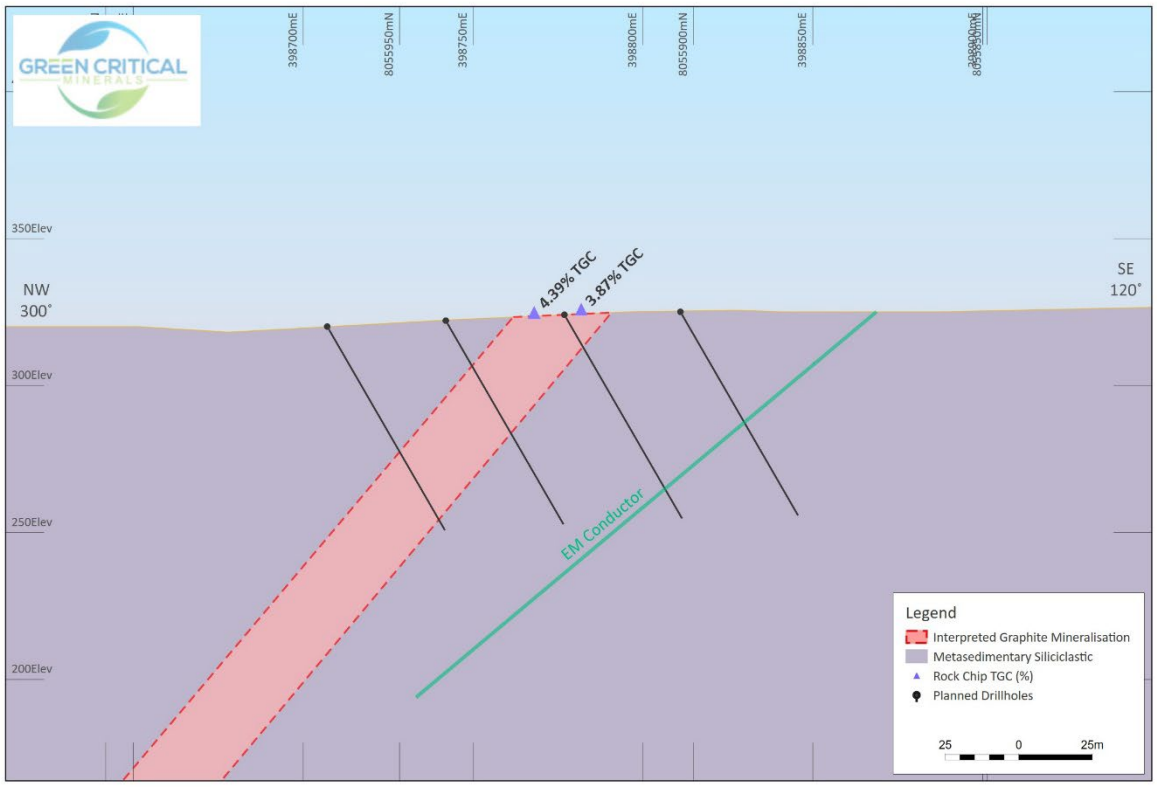

Figure 7; Schematic Drill section over the northern Threadfin trend with the planned drilling, rock chip samples and modelled EM plates.

TREVALLY

The Trevally trend (Figure 1) groups together the NNW-SSE striking EM highs in conjunction with the NE-SW striking EM high. Intermittent graphitic schist outcrop (Figure 6) was observed in the Trevally East target for almost 1 km in strike length. The exposed graphitic outcrop ranges in thickness up to 11m in width. Of the six rock chips collected, all samples returned assays greater than 1.34 % TGC with the peak of 4.94% TGC. This is very encouraging and prioritises the target for drill planning and ultimately drill testing. No drilling has ever been completed at Trevally with this being the first rock chip sampling program conducted at the exploration target. Drilling is planned to both follow up on the NW trending EM high where highly encouraging rock chip samples (Figure 8) have been collected and to concurrently test the north easterly trending EM high that is undercover and requires drill testing. There has been no historic drilling completed on the Trevally to date.

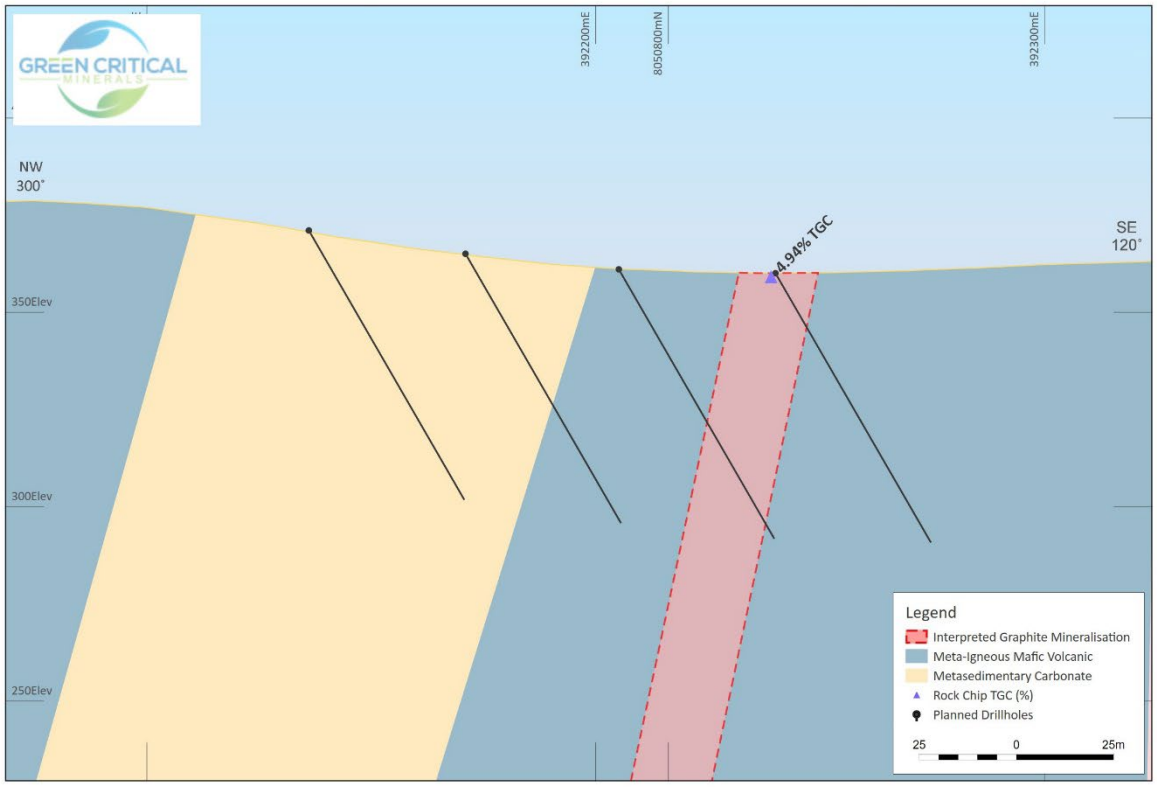

Figure 8; Schematic Drill section over the NW Trevally trend with the planned drilling and rock chip samples.

COBIA

The northern extensions of the Cobia trend (Figure 1) have been drill tested at 100 m drill spacing. The reconnaissance mapping program focussed on the southern extension to the drilling with **outcropping graphitic mineralisation noted up to 750 m past the southern extension of the drilling** (Figure 9). Examples of graphite mineralisation identified in the existing drilling at Cobia include 5m @ 3.9%TGC from 36m (T3GRC071), 6m @ 2.8% TGC from 22m (T3GR054) and 9m @ 3.7% TGC from 106m (T3GRC060).

Of the six rock chips collected, all samples returned assays greater than 2.16 % TGC with the peak of 6.65% TGC. This is very encouraging and prioritises the target for drill planning and ultimately drill testing. A total of 27 RC and diamond drill holes have been drilled at Cobia to the north. Drilling is planned to both test grade, thickness and strike extensions to the Cobia mineralisation (Figure 10).

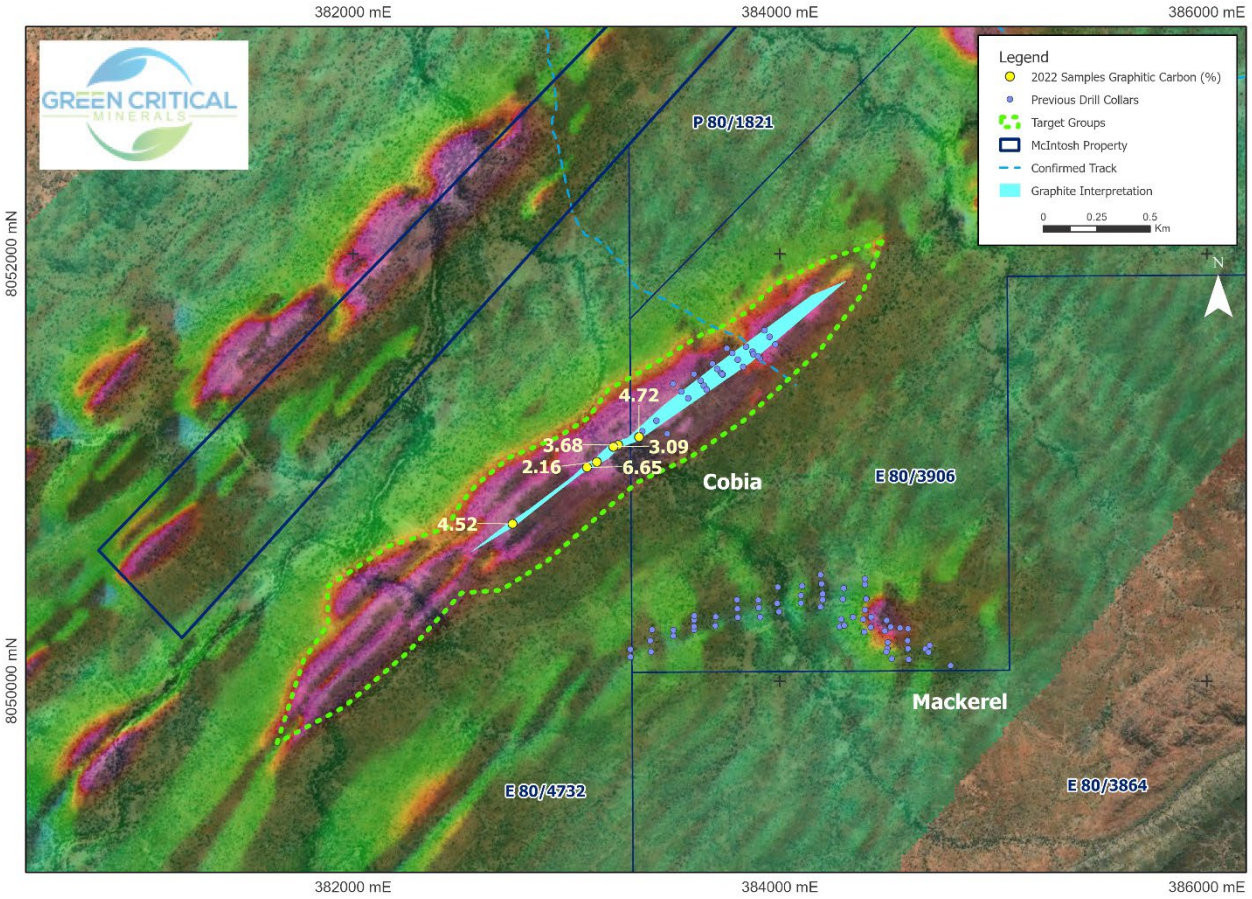

Figure 9; Mapping and rock chip results over the Cobia area and coincident EM anomalies.

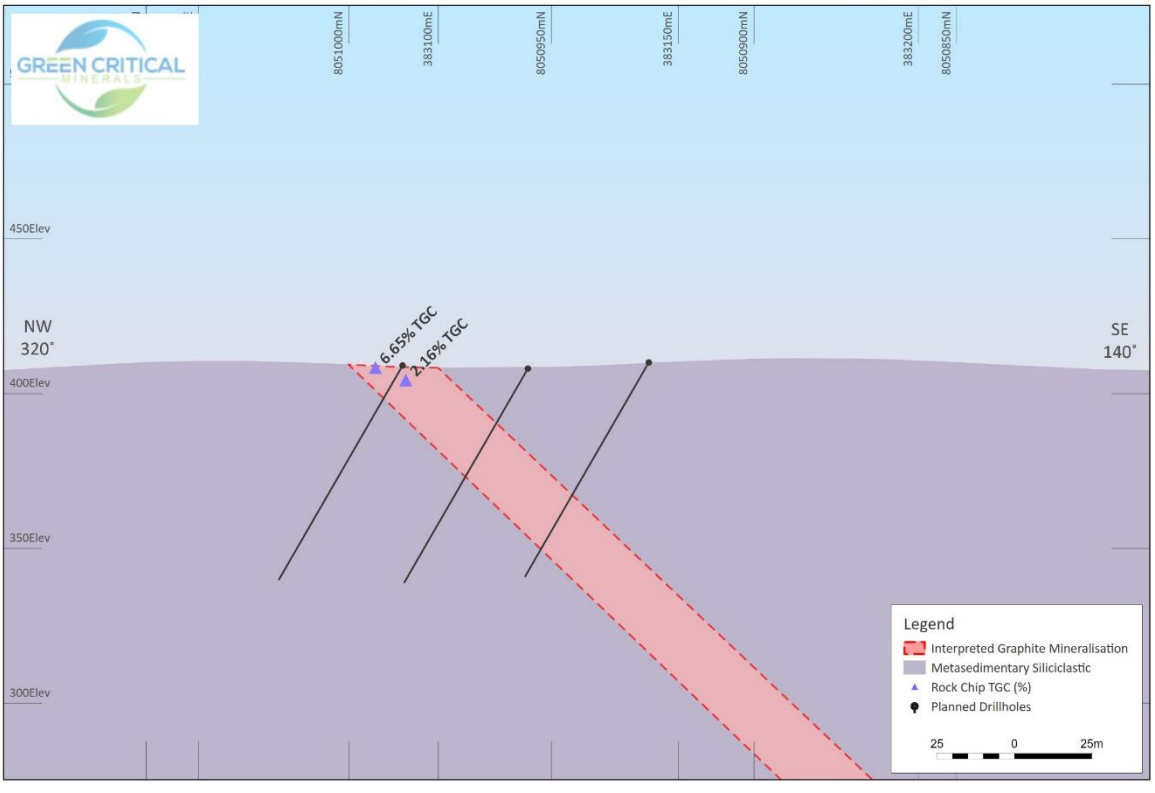

Figure 10; Schematic Drill section over the Cobia trend with the planned drilling and rock chip samples.

MARLIN

The Marlin target (Figure 11) represents a regionally significant EM anomaly with an exploration target of 30-60Mt[1] which was previously identified by Hexagon Energy Material Limited (ASX:HXG) to be a substantial target for graphite mineralisation. Field investigations were focussed on identifying the source of the EM anomaly and outcrop. **Outcropping graphite was discovered in the western limb of the Marlin trend (Figure 1), confirming the presence of graphite mineralisation in the area**. Of the six samples collected from the Marlin target, with results up to 3.37% TGC with the exception of two rock chips the remaining rock chips were sub 2.0% TGC. Field observations failed to adequately explain the EM anomalies and is considered to be a target that requires drill testing to further explain the significant modelled EM conductors present. A single line of holes is planned to target the modelled EM plates (Figure 11).

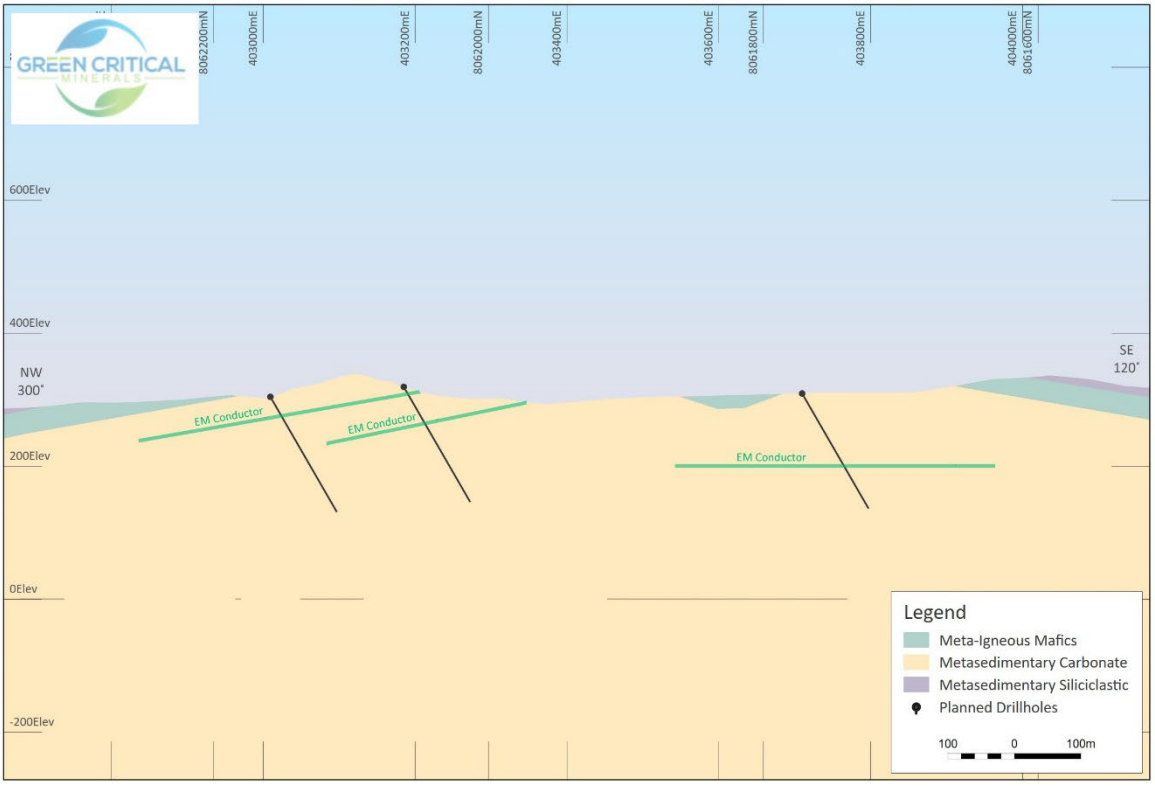

Figure 11; Schematic Drill section over the Marlin trend with the planned drilling and modelled EM conductors.

NEXT STEPS

With the preliminary field mapping and sampling program complete, the following works are underway as a matter of priority for GCM to advance the McIntosh Graphite Project.

- Review the results of the pending petrographically analysis to determine flake size of outcropping graphite mineralisation at the various target areas.
- Submit Program of Work with the DMIRS.
- Complete an on-ground heritage survey over the planned drilling areas to commence the process to get on the ground for GCM's maiden drill program in April.
- Engage a reputable engineering firm with significant graphite experience to commence the PFS.
- Initiate Pre-concentration test work using Ore Sorting. The Mcintosh material will be tested for its amenability for preconcentration, which involves rejection of waste early in the comminution process.

AUTHORISATION

The provision of this announcement to ASX has been authorised by the Board of Green Critical Minerals.

Green Critical Minerals confirms that it is not aware of any new information or data that materially affects the exploration results contained in this announcement and which were first announced to ASX on 28 October 2022 and 20 December 2022.

COMPETENT PERSON STATEMENT:

The information in this report that relates to the exploration activities are based on information compiled by Mr. S Nicholls, who is a Member of the Australian Institute of Geoscientists and full time employee of Apex Geoscience Australia Pty Ltd. Mr Nicholls has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the 2012 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Mr. Nicholls consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.